

Burnout and Well-Being in Trainees: Findings From a National Survey of US Obstetrics and Gynecology Residents

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ABSTRACT

Background Despite national attention on resident well-being, challenges persist. Effective solutions require greater understanding of personal and program factors.

Objective To explore burnout, resilience, self-reported mental health, and perceptions of the learning environment in a national sample of obstetrics and gynecology (OB/GYN) residents.

Methods An observational cross-sectional survey of OB/GYN residents taking the January 2022 national in-training examination included an abbreviated 2-item Maslach Burnout Inventory, a short version of the Connor-Davidson Resilience Scale, and subjective experience of other factors. Kruskal-Wallis and chi-square tests explored differences in outcomes and associations between variables.

Results Among 5761 residents taking the examination, 3741 (64.9%) participated, with 2425 of 3741 (64.8%) reporting burnout, 2138 (57.2%) depression, 2651 (70.9%) anxiety, and 147 (3.9%) suicidal ideation. Women fared worse than men in terms of burnout (2105 of 3147, 66.9% vs 281 of 496, 56.7%, $P < .001$), depression (1843 of 3147, 58.6% vs 256 of 496, 51.6%, $P = .004$), anxiety (2318 of 3147, 73.7% vs 294 of 496, 59.3%, $P < .001$), and resilience (5.9 ± 2.1 vs 6.2 ± 2.1 , $P = .006$). More nonbinary residents considered leaving residency (17 of 49, 34.7% vs 676 of 3147, 21.5% [women] and 108 of 496, 21.8% [men], $P = .008$). Race-based differences were seen in depression, suicidal ideation, and thoughts of leaving residency. Increased binge drinking was reported with increasing postgraduate year. Among 614 residents reporting that well-being was not a priority in their program, 539 of 614 (87.8%) reported burnout, 469 of 614 (76.4%) depression, and 508 of 614 (82.7%) anxiety.

Conclusions Residents report high rates of mental health concerns, and these are worse among women, gender nonconforming individuals, Black residents, and those who perceive well-being is not a priority in their training program.

Introduction

The COVID-19 pandemic has adversely impacted physicians in training across specialties, aggravating concerns about well-being.¹⁻⁸ Poor physician well-being threatens patient care, resulting in higher rates of medical errors, health care costs, and increased racial biases that may widen preexisting health care disparities.^{9,10} Understanding which factors in residents' lives and the clinical environment influence mental health can help educators advocate for solutions.

Identified drivers of burnout are excessive workloads, inefficient work processes, work-home conflict, and program culture and structures.¹¹ The Accreditation Council for Graduate Medical Education (ACGME) mandates that programs establish environments that destigmatize mental health concerns.¹² Despite strong evidence regarding the importance of

addressing burnout for the benefit of physicians, as well as their patients, education leaders and trainees may not feel empowered to make changes due to the systemic sources of burnout. Given the competing demands in graduate medical education, understanding the scope of the problem and the value of educational interventions in addressing it is essential to advocate for and identify necessary resources.

Obstetrics and gynecology (OB/GYN) residents have high burnout rates due to strenuous working conditions and emotional patient experiences.¹³ A 2017 national study of OB/GYN residents demonstrated a high prevalence of self-reported problems: 51% burnout, 32% depression, 13% binge drinking, and 4% suicidal ideation, with rates increasing throughout training.¹⁴ Residents' perception of the priority programs placed on well-being was inversely associated with their reported well-being, and the authors exhorted training programs to implement solutions.

Five years after the initial study, this survey of residents in 2022 aims to explore the experience of distress in OB/GYN residents, and to determine whether

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Editor's Note: The online supplementary data contains the survey used in the study and a visual abstract.

patterns observed among trainees changed during the COVID-19 pandemic. Through this lens, the study aims to identify opportunities for intervention at the level of individual residents, programs, and throughout the specialty.

Methods

Setting and Participants

This cross-sectional study used an electronic survey administered to all US OB/GYN trainees following the Council on Resident Education in Obstetrics and Gynecology in-training examination in January 2022. Responses from residents providing consent to participate were collected anonymously and not linked to performance on the in-training examination. Residents were not required to complete each question of the survey.

Outcomes Measured

The survey consisted of 16 total items (online supplementary data), including some items assessed in the prior study of OB/GYN resident well-being.¹⁴ Demographic information regarding gender, race, and marital status was included. The 2022 survey used a 2-item screening tool, an abbreviated version of the Maslach Burnout Inventory (MBI), defining burnout as a summative score of higher than 3 on the emotional exhaustion and depersonalization items.¹⁵⁻¹⁷ Resilience was assessed using the 2-item version of the Connor-Davidson Resilience Scale (CD-RISC2). Each item is rated on a 5-point scale (0-4), with higher scores reflecting greater resilience. Mean resilience score in the general population is 6.91.¹⁸ Similar to the 2017 survey created by the authors, residents were asked to rate the importance their program placed on resident well-being (called “wellness” in that earlier survey, but defined as the active pursuit of good health of all team members, which aligns with the ACGME use of the term “well-being”). Residents answered single-item self-report questions about symptoms of depression, binge drinking behavior, and thoughts of suicide. In addition, the 2022 survey included questions about anxiety and thoughts of leaving the residency program.

Analysis

The study was powered based on the primary outcome of differences in burnout by year in training to detect a 10% difference between groups at a significance of 0.05.¹⁴ Given multiple comparisons for this article, significance was adjusted to a *P* value of .01. Secondary outcomes included resilience scores; self-reported symptoms of depression and anxiety, frequency of binge

KEY POINTS

What Is Known

To improve resident well-being, we need to better understand how personal and program factors contribute to well-being or its absence.

What Is New

This national survey of US obstetrics and gynecology residents using the Maslach Burnout Inventory, a short version of the Connor-Davidson Resilience Scale, and questions about other factors showed that more than half had experienced burnout, depression, and anxiety; differences were seen based on gender, race, and postgraduate year in various measures.

Bottom Line

Program directors addressing well-being can incorporate these results as they plan targeted and customized interventions to support residents and fellows.

drinking, drug use, suicidal ideation, and thoughts of leaving the residency; and differences in outcomes based on postgraduate year (PGY), gender, marital status, and racial identity. For analysis, residents identifying with more than one racial group were put into a single group labeled “multiple racial identity.” Respondents indicating nonbinary, gender-nonconforming, or “identity not listed” were grouped as “nonbinary/other gender.” Chi-square and Kruskal-Wallis tests were used to explore associations. Following statistical tests with overall significant results, post-hoc pairwise comparisons were made using the Bonferroni method to determine which specific groups differed. Statistics were performed using IBM SPSS (Version 29.0).

The resident survey was deemed exempt by the Health Media Lab Institutional Review Board and was deemed to carry no more than minimal risk to respondents since the responses were anonymously collected.

Results

Of the 5761 residents who took the in-training examination, 3741 (64.9%) respondents consented to taking the survey, reported being current residents with PGY information, and were included in the analysis. These included 1003 of 3741 (26.8%) PGY-1, 943 of 3741 (25.2%) PGY-2, 918 of 3741 (24.5%) PGY-3, and 877 of 3741 (23.4%) PGY-4 residents. Demographic data are shown in TABLE 1. The majority (2425 of 3741, 64.8%) of residents met criteria for burnout using the 2-item MBI scale and 2138 of 3741 (57.2%) reported symptoms of depression. Though assessed with a different measure in 2017 (a single-item self-report), this represents worse rates in 2022 for burnout (2425 of 3741, 64.8% vs 2592 of 4999, 51.9%; OR 1.71; 95% CI 1.57-1.87; *P*<.001) and depression (2138 of 3741,

TABLE 1
Demographic Information of 2022 Council on Resident Education in Obstetrics and Gynecology Examination Survey Respondents

Characteristic	n (%) N=3741
Postgraduate year (PGY) in training	
PGY-1	1003 (26.8)
PGY-2	943 (25.2)
PGY-3	918 (24.5)
PGY-4	877 (23.4)
Gender identity	
Woman	3147 (84.1)
Man	496 (13.3)
Nonbinary/other gender	49 (1.3)
Marital status	
Married	1447 (38.7)
In a relationship	1355 (36.2)
Single	781 (20.9)
Divorced/separated/ widowed	36 (1.0)
Racial identity	
White	2214 (59.2)
Asian	544 (14.5)
Black	265 (7.1)
Latinx/Hispanic	243 (6.5)
Native American/Native Hawaiian	10 (0.3)
Multiple racial identities	207 (5.5)

Note: Values shown only for participants reporting demographic data; those who did not report demographic information are not represented in this table.

57.2% vs 1602 of 4999, 32.0%; OR 2.83; 95% CI 2.59-3.09; $P < .001$). While not assessed in the prior survey, anxiety symptoms were reported by 2651 of 3741 (70.9%) residents in 2022. In 2022, residents rated their resilience 5.8 ± 2.2 on the CD-RISC.¹⁸ Resilience and burnout were associated: those who met criteria for burnout had a mean resilience score of 5.4 ± 1.3 versus 6.7 ± 1.3 without burnout ($P < .001$). Resilience, but not burnout, differed between years of training, with upper-level residents reporting higher resilience than PGY-1s (PGY-1: mean 5.61 ± 2.3 , PGY-2: 5.76 ± 2.2 , PGY-3: 5.95 ± 2.1 , PGY-4: 6.04 ± 2.1 , $P = .005$). Binge drinking and illicit drug use increased between 2017 and 2022 (binge drinking: 628 of 4999, 12.6% vs 586 of 3741, 15.7%, $P < .001$; illicit drug use: 56 of 4999, 1.1% vs 109 of 3741, 2.9%, $P < .001$). Binge drinking was more common in PGY-3 and PGY-4 (PGY-1: 125 of 1003 [12.5%], PGY-2: 133 of 943 [14.1%], PGY-3: 162 of 918 [17.6%], PGY-4: 166 of 877 [18.9%], $P = .002$).

The 2022 analysis revealed differences in well-being based on gender identity, marital status, and race (TABLE 2). Burnout was reported by 2105 of 3147 (66.9%) women, 32 of 49 (65.3%) nonbinary/other gender individuals, and 281 of 496 (56.7%) men. Symptoms of depression were reported by 1843 of 3147 (58.6%) women, 30 of 49 (61.2%) nonbinary/other gender individuals, and 256 of 496 (51.6%) men. Symptoms of anxiety were reported by 2318 of 3147 (73.7%) women, 40 of 49 (81.6%) nonbinary/other gender individuals, and 294 of 496 (59.3%) men. These differences in burnout, anxiety, and depression were significantly different between men and women. Thoughts of leaving residency were reported by 17 of 49 (34.7%) of nonbinary/other gender individuals, significantly more than by women (676 of 3147, 21.5%) and men (108 of 496, 21.8%). Higher mean resilience was reported by men (6.2 ± 2.1) than women (5.9 ± 2.1). Different rates of reported anxiety and depression symptoms and thoughts of leaving the program were observed based on marital status, suggesting improved well-being for residents supported in relationships. Specific rates of these outcomes are displayed in TABLE 2.

Burnout rates did not differ significantly according to race. There were significant differences based on racial identity for reported symptoms of depression, anxiety, suicidal ideation, and thoughts of quitting residency. Among residents identifying as Black, 176 of 266 (66.2%) reported symptoms of depression, significantly more than other groups. Anxiety symptoms were most commonly reported by residents identifying as White (1633 of 2225, 73.4%), Black (195 of 266, 73.3%), Latinx/Hispanic (168 of 245, 68.6%), or endorsing multiple racial identities (151 of 208, 72.6%). Though binge drinking and illicit drug use were relatively uncommon, significant differences were seen according to race and marital status (TABLE 2). Suicidal ideation was significantly more common among residents identifying as Black (23 of 266, 8.6%), more than twice the rate reported by residents identifying as White, Asian, or multiple groups. Of residents identifying as Black, 90 of 266 (33.8%) reported considering quitting residency, a significantly higher rate than other groups.

Most residents (2809 of 3741, 75.1%) reported that physician well-being was “a priority” or “somewhat a priority” in their training program. The 614 of 3741 (16.4%) residents who reported that well-being was “not a priority” in their program reported worse outcomes: 539 of 614 (87.8%) met criteria for burnout, 469 of 614 (76.4%) reported symptoms of depression, 508 of 614 (82.7%) symptoms of anxiety, and 266 of 614 (43.3%) considered leaving the training program, 4 times the rate of trainees at programs where they

TABLE 2

Association of Obstetrics and Gynecology Resident Demographics With Measures of Well-Being

Characteristic	Overall, n (%) N=3741	Women, n (%) N=3147	Men, n (%) N=496	Nonbinary/ Other Gender, n (%) N=49	P value
Gender					
Burnout	2425 (64.8)	2105 (66.9) ^a	281 (56.7) ^b	32 (65.3) ^{a,b}	<.001
Depression ^c	2138 (57.2)	1843 (58.6) ^a	256 (51.6) ^b	30 (61.2) ^{a,b}	.004
Anxiety ^c	2651 (70.9)	2318 (73.7) ^a	294 (59.3) ^b	40 (81.6) ^{a,b}	.001
Binge drinking	586 (15.7)	462 (14.7)	97 (19.6)	10 (20.4)	.09
Drug use	109 (2.9)	85 (2.7)	24 (4.8)	0 (0)	.10
Suicidal ideation	147 (3.9)	122 (3.9)	19 (3.8)	5 (10.2)	.84
Thoughts of quitting residency	803 (21.5)	676 (21.5) ^a	108 (21.8) ^a	17 (34.7) ^b	.008
Resilience, mean±SD	5.8±2.2	5.9±2.1 ^a	6.2±2.1 ^a	5.3±2.8 ^b	.006

Characteristic	Overall, n (%) N=3741	Married, n (%) N=1447	In a Relationship, n (%) N=1355	Single, n (%) N=781	Divorced/ Separated/ Widowed, n (%) N=36	P value
Marital Status						
Burnout	2425 (64.8)	949 (65.6)	911 (67.2)	495 (63.4)	25 (69.4)	.60
Depression ^c	2138 (57.2)	805 (55.6) ^a	803 (59.3) ^a	470 (60.2) ^a	26 (72.2) ^b	.005
Anxiety ^c	2651 (70.9)	1022 (70.6)	1002 (73.9)	553 (70.8)	29 (80.6)	.07
Binge drinking	586 (15.7)	198 (13.7) ^a	231 (17.0) ^{ab}	134 (17.2) ^{ab}	13 (36.1) ^b	<.001
Drug use	109 (2.9)	30 (2.1) ^a	42 (3.1) ^{ab}	34 (4.4) ^b	2 (5.6) ^c	<.001
Suicidal ideation	147 (3.9)	45 (3.1) ^a	47 (3.5) ^{ab}	45 (5.8) ^b	5 (13.9) ^c	<.001
Thoughts of quitting residency	803 (21.5)	288 (19.9) ^a	288 (21.3) ^{ab}	202 (25.9) ^b	10 (27.8) ^{ab}	.007
Resilience, mean±SD	5.8±2.2	6.0±2.1 ^a	5.9±2.0 ^{ab}	5.8±2.1 ^b	5.8±1.9 ^b	<.001

Characteristic	White, n (%) N=2225	Black, n (%) N=266	Asian, n (%) N=551	Latinx/ Hispanic, n (%) N=245	Native American/ Native Hawaiian, n (%) N=10	Multiple Racial Identities, n (%) N=208	P value
Racial Identity							
Burnout	1498 (67.3)	170 (63.9)	336 (61.0)	149 (60.8)	7 (70.0)	138 (66.3)	.08
Depression ^c	1298 (58.3) ^a	176 (66.2) ^b	298 (54.1) ^a	134 (54.7) ^a	4 (40.0) ^a	110 (52.9) ^a	<.001
Anxiety ^c	1633 (73.4) ^a	195 (73.3) ^a	363 (65.9) ^b	168 (68.6) ^{ab}	6 (60.0) ^b	151 (72.6) ^a	.003
Binge drinking	399 (17.9) ^a	37 (13.9) ^b	59 (10.7) ^b	33 (13.5) ^b	0 (0) ^c	38 (18.3) ^a	<.001
Drug use	68 (3.1)	12 (4.5)	14 (2.5)	6 (2.4)	0 (0)	8 (3.8)	.60
Suicidal ideation	80 (3.6) ^a	23 (8.6) ^b	16 (2.9) ^a	14 (5.7) ^a	0 (0) ^c	7 (3.4) ^a	<.001
Thoughts of quitting residency	447 (20.1) ^a	90 (33.8) ^b	128 (23.2) ^a	53 (21.6) ^a	1 (10.0) ^a	38 (18.3) ^a	<.001
Resilience, mean±SD	6.0±2.0 ^a	5.7±2.4 ^{ab}	5.8±2.0 ^{ab}	5.7±2.4 ^{ab}	5.4±2.5 ^b	6.2±2.0 ^a	.002

^{ab} Superscript letter indicates values differ significantly based on post-hoc pairwise comparisons using the Bonferroni correction within the particular response. (eg, For depression, suicidal ideation, and thoughts of quitting residency, there was a significant difference between responses from Black residents compared to other races. For anxiety, there was a significant difference between Asian, Native American/Native Hawaiian respondents and those from White, Black, and multiple racial identities, but neither set showed a difference from Latinx/Hispanic respondents. For binge drinking, White and multiple racial identity respondents differed from Black, Asian, and Latinx/Hispanic respondents, and both groups differed from Native American/Native Hawaiian respondents. Reports of resilience differed between White/multiple racial identity respondents and Native American/Native Hawaiian respondents, and neither set differed significantly from Black, Asian, or Latinx/Hispanic respondents.)

^c Depression and anxiety symptoms were reported in a single-item subjective measure, not a formal screening tool.

TABLE 3

Association Between Residents' Perception of Priority of Well-Being in Residency Program and Reported Well-Being

Characteristic	A Priority, n (%) N=956	Somewhat a Priority, n (%) N=1853	Not a Priority, n (%) N=614	P value
Burnout	512 (53.6) ^a	1300 (70.2) ^b	539 (87.8) ^c	<.001
Depression ^d	486 (50.8) ^a	1122 (60.6) ^b	469 (76.4) ^c	<.001
Anxiety ^d	650 (68.0) ^a	1422 (76.7) ^b	508 (82.7) ^c	<.001
Binge drinking	133 (13.9) ^a	308 (16.6) ^{ab}	130 (21.2) ^b	.006
Drug use	28 (2.9)	58 (3.1)	22 (3.6)	.58
Suicidal ideation	19 (2.0) ^a	70 (3.8) ^a	51 (8.3) ^b	<.001
Thoughts of quitting residency	102 (10.7) ^a	407 (22.0) ^b	266 (43.3) ^c	<.001
Resilience, mean±SD	6.4±1.6 ^a	6.2±1.7 ^a	6.0±1.6 ^b	<.001

Note: Reported well-being: Participants were asked what priority the residency program placed on wellness, defined as the "active pursuit of good health of all team members in relation to other required aspects of residency program." Respondents selecting "prefer not to answer" are not shown.

^{a,b,c} Superscript letter indicates values differ significantly based on post-hoc pairwise comparisons using the Bonferroni correction within the particular response. (eg, For burnout, depression, anxiety, and thoughts of quitting residency, there was a significant difference between responses based on whether they reported well-being was a priority in the program^a, somewhat a priority^b, or not a priority^c.) Responses with the same superscript letter did not differ significantly. (eg, Reports of binge drinking were significantly different between those who rated well-being "a priority" and "not a priority," but these reports of binge drinking in these groups did not differ significantly from those rating well-being "somewhat a priority." Reports of suicidal ideation and resilience did not differ between those rating well-being "a priority" and "somewhat a priority" but were significantly different from those rating well-being "not a priority.")

^d Depression and anxiety symptoms were reported in a single-item subjective assessment, not a formal screening tool.

reported well-being was "a priority" (TABLE 3). Mean resilience scores were also lower among residents who reported well-being was not a program priority.

Discussion

Residents reported higher rates of distress on this national survey than 5 years earlier, with higher rates of burnout, depression symptoms, binge drinking, and drug use. Women reported higher rates of burnout, depression, and anxiety than men, and nonbinary/other gender individuals reported higher rates of considering leaving residency. Worse mental health outcomes, including depression, anxiety, and thoughts of quitting residency, were observed among residents identifying with historically underrepresented groups. Social support may be protective, as residents in relationships reported lower distress, as did those who perceived well-being as a residency program priority.

Anxiety, depression, and burnout among residents are commonplace. The increase in distress suggests a problematic culture where a high-stress, high-anxiety learning climate is tolerated. It is notable that in this study, three-quarters of residents who perceived that well-being was not a priority reported burnout, depression, and anxiety. The COVID-19 pandemic likely heightened these grim findings, but other factors influence well-being. Training programs need to be intentional about supporting trainees from all backgrounds. These findings are consistent with prior work describing the intersectionality of stressors in other specialties.^{19,20}

Multiple levels of intervention are needed to foster belonging in an inclusive and supportive learning environment for residents facing racism.²¹⁻²⁴ Black residents in our study reported higher rates of depressive symptoms and suicidal ideation. Underrepresented residents might feel isolated and may benefit from social support and culturally concordant mentoring.²⁴ Analogous efforts to strengthen mentoring and support for sexual and gender minority physicians, who fared worse on all measures of well-being in this study, are also crucial. A regional peer support network may help reduce the burden of the minority tax for faculty from underrepresented backgrounds.²⁵ Programs must also be prepared to address patient-initiated harassment.²³

A 4% rate of suicidal ideation (twice the rate reported by the World Health Organization²⁶) means that 147 respondents in this group had contemplated suicide. Suicide is a leading cause of death among resident physicians.^{26,27} Addressing the 18% reporting binge drinking is also important, as this increases during training and has been linked to poorer reported mental health outcomes.²⁸ Resilience levels were lower than those in the general population, which may be explained by high rates of burnout.^{18,29,30}

Changes to working conditions and organizational support for physicians are needed.³¹ Programmatic efforts may contribute to an enhanced perception of the priority that a program or institution places on well-being.²⁷ The association between this perception and poor outcomes in this study indicates that residents who need support may not be getting it. While

efforts to support well-being have demonstrated modest gains, sustained improvement requires organizational and administrative support for changes to the working environment.³² In 2018, a standard curriculum was piloted in 25 OB/GYN residency programs across the country and found to improve professional fulfillment and decrease burnout.³³ This curriculum was made available to all residency programs in 2019. Residents and faculty members involved in the curriculum had polarized reactions: while participants valued learning skills and connecting to colleagues, they acknowledged that educational interventions may not address the source of burnout.³⁴ Structural and organizational initiatives to reduce the sources of workplace stress may have greater impact on physician well-being. Coaching programs, for example, have successfully addressed issues of well-being among residents.^{35,36} Frameworks for changing work conditions focus on reducing unnecessary tasks and improving job resources such as technology, staff, relationships, and excessive workload.³⁷ Working together across specialties and institutions to find opportunities for change is essential and can improve residents' well-being.

Residency programs and their institutions should promote a culture of understanding, awareness, openness, and tolerance, where the topics of burnout, anxiety, and depression are discussed without judgment or fear of retribution. Residents should be made aware of mental health resources available to them and be provided the necessary coverage for mental health appointments. The ACGME Common Program Requirements clearly state that faculty and residents must learn how to identify physicians at risk for

burnout, depression, substance use disorders, and suicidal ideation, and ensure that residents and faculty have access to the means for supporting these physicians in distress.¹²

The past decade has seen a shift in the conceptualization of physician well-being from an individual person's obligation to maintain their own self-care, to the recognition that pervasive occupational distress increases moral injury and causes negative outcomes for patients and society. Practical solutions acknowledging the humanity of the health care workforce might prevent occupational distress.^{37,38} The FIGURE displays practical steps that programs might take to address trainee well-being, including direct offerings tailored to meet resident needs and support for self-care and better integration of work with home life demands. Making programs visible and accessible to trainees reinforces priority of physician well-being within the training environment. Some activities within each domain are displayed. Leaders should consider opt-out interventions given high baseline levels of distress. In the context of OB/GYN, over 80% of this sample of residents were women; higher rates of distress among women are a call to action. The field has the opportunity to lead, not lag, in creating a culture where residents can have some flexibility to fulfill their expectations and responsibilities outside of work. Caregiving responsibilities were not explored in this study but should be addressed in future work.

Some factors merit caution when interpreting this study. The COVID-19 pandemic likely elevated these concerns and may not represent the long-term

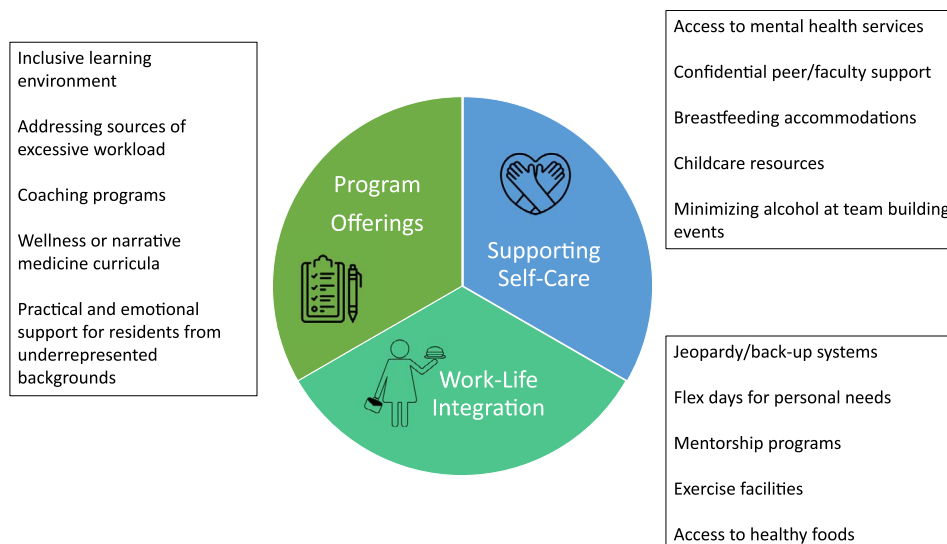


FIGURE
Recommended Actions for OB/GYN Residency Programs to Promote Physician Well-Being

Note: Residency programs can support trainee well-being by direct offerings tailored to resident needs and also by supporting residents' efforts to care for themselves and integrate their work with their home life demands.

experience for OB/GYN residents. Comparisons to the earlier study are limited by the difference in measures used to assess burnout, the addition of measures for resilience, and the exclusion of anxiety from the prior study. The benefits of using tools with strong validity evidence outweigh the inconsistency in measures between studies, but this does limit interpretation of the differences between the 2 timepoints. Additionally, the study relied on an inclusive interpretation of the 2-item burnout screening score, summing the emotional exhaustion scores, but did not require participants to meet criteria for burnout in either domain, which is a more restrictive interpretation of the score.¹⁷ Using a more conservative interpretation of the screening tool might result in smaller differences between groups than those observed. For the sake of brevity and to decrease stress, more substantial measures for screening for mental health conditions were not included, so we used self-report, which is less reliable. A potential limitation to interpreting differences based on racial identity is that 7% of respondents chose not to provide this information. Nevertheless, exploring these findings in future studies is important. Future work can also investigate whether there are differences in measures based on geography of residency program and type of residency program.

Conclusions

Residents report high rates of mental health concerns, and these are worse among women, gender nonconforming individuals, Black residents, and those who perceive well-being is not a priority in their training program. Support from programs may play a role in reducing clinician experiences of distress.³⁸

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